ASHRAE Leadership Recall (formerly Leadership Recalled)

Transcription

Interview of: M.T. Gossett (Part One)

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Interviewed by: Mike Kearney

Note: Note: This is a retype of the original transcript located in the ASHRAE Library. The audio tape of this transcript of Part One of the interview no longer exists. Part Two of the interview is posted on the ASHRAE website.

M.K.
This is the 5th of September and the purpose of this tape is to record a little of the early history of refrigeration and air-conditioning sciences as it started in Nashville, Tennessee. I guess what we ought to do is to start out by saying, "Who is M.T. Gossett and how did he get into the air-conditioning business?"

M.T. Gossett
Well now, how far back do you want to go on this thing?

M.K.
Well, when Mark Young was in here he talked to me about you working for Nashville Machine as a project engineer, and evidently that was very much in the early stages of the development of refrigeration here in Nashville.

M.G.
Well, my experience in refrigeration started when I was about four years old. I was born out in Dixson, Tennessee, forty miles west of here, and in the summertime my way of making money, aside from handling the Nashville __ and delivering it was working for a gentleman who ran an ice wagon in the morning. In the evening I would go down to the plant and help the engineer operate the steam building compressors and oil them and get__ , wood boilers in those days, and William Wooten fired the boiler and used a helper around the engine room. I learned how to operate and how to make ice and stuff like that, even when I was very young.

M.K.
All right. So when you were twelve, let's date you now, when you were twelve, about what year was that?

M.G.
That was in 1915.

M.K.
1915, okay.

M.G.

The first time I got involved in the construction business, my brother was working for Memphis Engineering Company in Memphis, Tennessee, and he had an ice plant installed in Ruralville, Mississippi I went over there and stayed and helped him install that plant. When e got through, they didn't have anybody to run it, and I was about sixteen years old then. They wanted me to stay there the rest of the summer. I stayed there a couple of months and operated the plant and trained somebody else to run it. Then I went back to Memphis.

M.K.

Let's talk about those early ice plants. What did it involve to run them? You mentioned a wood fire boiler.

M.G.

In the early stages Triumph Machine Company built a steam__ ammonia compressor. You had the steam engine on one side and a compressor on the other side and the steam engine operated the ammonia compressor. Then they had__ they were filled with tins about 11x22 by 4 feet high, and you would freeze a block of ice in those tins. They had a horse that would pull it out and put in on the ramp and dump it in the storage room.

M.K.

Would the ice come out easily or would you have to..

M.G.

You had to sprinkle them, hold two tins and turn them over and the water would come on and sprinkle the tin and then as soon as it loosened up it would run down the ramp and go in the storage room.

M.K.

I see.

M.G.

They were 300 pound blocks, it was amazing.

M.K.

When Mark Young was here he talked about the difficulty of moving 300 pound blocks, but you learned an art to that and if you did it the right way you could move it pretty readily, one man.

M.G.

After I left that plant in Mississippi I went over in Arkansas, just about 20 miles outside of Memphis. It was a 200 ton ice plant called Railways Ice Company and they manufactured ice for Frisco Railroad fruit cars coming up from Florida. I worked in that plant as assistant to the night engineer. In the daytime they had planes coming through. We would pull enough ice chain conveyors up on top of a _ in which we would break that ice up into 100 pound blocks and we would ice a whole plane in maybe a couple of hours. They would pull it out when the plane left Memphis and it would be there in 15-20 minutes. We would start putting ice up on top and then we would slide it down in the bunkers at the end of the fruit cars.

M.K.

How many pounds of ice would it take to do a train?

M.G.

Well it would take about 15-20 blocks for each car. In those days you had 50-60 cars and…

M.K.

That's a bunch of ice.

M.G.

We would break up ice and shove it in those cars.

M.K.

You put the ice in bunkers in fruit storage cars?

M.G.

In each end.

M.K.

That's the way you refrigerated fruit?

M.G.

In Pullman cars they had ice tanks in under with a fan to circulate the ice box in Pullman cars and cool them when they first started.

M.K.

Was it effective.

M.G.

Yes. It was pretty effective.

M.K.

How long would the ice last after you loaded it in?

M.G.

It would probably last overnight. If they were going to Chicago, and that's where most of them went, or Kansas City, till they would get to the next icing station.

M.K.

Was it mainly fruit or was there any meat?

M.G.

Mainly fruit.

M.K.

The early refrigeration then was all ammonia compressors.

M.G.

Yes, they had huge compressors I know at the Railways Ice Company. A steam engine, the fly wheel on the compressor was taller than this room. It would run over about 150 RPM.

M.K.

That was a big engine. This room is about 12 feet high.

M.G.

The fly wheel you had to oil about every hour, check the lubrication, keep them full of oil.

M.K.

So you had a pretty good introduction to refrigeration long before comfort cooling came along.

M.G.

Right.

M.K.

Say in your own way how you saw this evolving and how you progressed with the art.

M.G.

My father died when I was 17. I had worked as a helper for him, he was a contractor. When he died my brother was working for Hoosier Ice Machine Works in Evansville, Indiana. I went up there and went to

work for them helping to install ice plants in cold storage rooms, freezers for manufacturing ice cream and stuff like that. When I was 19 years old they shipped an Ice plant out to Brazil, Indiana. They shipped me a tool box and a roll of plans. My brother came by and looked the job over and said, "Well, there is your tool box and the plans and the equipment all on the flat car." I stayed there and unloaded everything and put the plant together. That was the first plant I built by myself.

I

You physically built the whole thing by yourself?

M.G.

I had blueprints and plans to work with. We did a lot of refrigeration work building ice plants in Indiana.

M.K.

Did they give you all the components are did you have to cut and fit pipe to put the thing together and all that?

M.G.

We had to cut pipe. Do it all by hand. We had some helpers.

M.K.

And it worked? How long did it take you to do that?

M.G.

It took about a month to finish that thing. It was driven by diesel engines. We had to install diesel engines to operate the compressors and everything else to run off the belts.

M.K.

So now we have diesel fuel driving compressors.

M.G.

That's right.

M.K.

But there were compressor manufacturers that were dealing with refrigerants at this stage.

M.G.

Yes, I would say that Gulf Iron developed plants, one of the first ammonia compressors and then Frick Company back around 1865, they developed, they were in the steam engine business and the saw mill business and they developed ammonia compressors. They got in the ice making plants.

I

1865.

M.G.

Yes, back before the Civil War, I believe it was 1868 when they built their first ammonia plant. There were two brother who worked for Frick Company in the engineering machine shop. They went over to York, Pennsylvania and got the _ Industry to back them in making compressors and they started York Company. That is where the York Company started.

I

Do you know the names of those two brothers?

M.G.

I knew them both. I met them both. I used to belong to NAPRE in Memphis. I finally went down to Memphis and I met them both in Louisville when there was a NAPRE meeting. That was back in about 1927 and they were the two brothers who started the York Company.

M.K.

Did they manufacture ammonia compressors also?

M.G.

Yes, they started making ammonia compressors similar to Frick Company's. They become one of the largest manufactures in America on ammonia compressors. York and Frick they both were out of Milwaukee. People, Germans, they came over from Germany and started to build the company in Milwaukee.

M.K.

So these are three manufacturers or sources of compressors here in this country.

M.G.

Three very early ones. Triumph was one. There was another very interesting old compressor at the time that was here in Nashville when I came up here from Memphis. I think it was called the Hercules, it was a walk-in type. It had a steam engine on one side and a wrapper arm on the other side that pushed two pistons up and down. Hercules developed that old type of compressor, it was an ice _. I met a Meadows, Vaughn and Howler.

M.K.

That was an ice plant?

M.G.

That was a ice manufacturing business and coal. Most all the ice companies were also in the coal business because of being a year-round business.

M.K.

Did they use coal to fuel their boilers?

M.G.

A lot of them back in those days, Atlantic Ice Company, yes, formally Atlantic Ice and Fuel. Their original compressors were steam driven. When they got big power plants they were able to get away from steam boilers or they either put in the old power generators.

M.K.

So they generate their own electricity on site.

M.G.

Yes.

M.K.

So prior to 1930 refrigeration arts were primarily associated with ice plants, the manufacture of ice.

M.G.

Ice and cold storage.

M.K.

How did they do cold storage-ammonia?

M.G.

They used ammonia. I got involved up in Indiana. I came back to Memphis and I worked for the United Iron Works who built the Sterling ammonia compressors in Springfield, Missouri. As I recall in 1925 and 1926 we installed around 30 small block ice making plants in Mississippi, Arkansas and west Tennessee. After that time I got to where I was selling and installing.

M.K.

Who were you selling these small ice plants to?

M.G.

Primarily to individuals in small towns.

M.K.

A milk distributor or someone like that?

M.G.

The first work I did, a banker in Batesville, Mississippi who owned an ice plant there, he wanted me to come over there and overhaul it and get it straightened out for him. That was around 1920. I did that and then he bought a whole new plant from _ Ice Machine people. I stayed over there and installed it for him. I stayed there and ran it that summer. He had another plant in Charleston, MississippM.K. United Iron Works needed construction engineers and so the man who was running them at this office told me if I wanted to go to work for United Iron Works that I could go work for them. They were shipping a 20 ton ice plant over to Arkansas. I went over there and installed the plant for them. When I got through with that I went over to Henderson, Tennessee and installed one there.

M.K.

How big physically was a ten ton ice plant?

M.G.

Well, it takes 12 300-pound cans, 12 to 14 tins to produce a ton of ice. If you wanted, say a 10 ton plant for instance, you would take 120 can which would pull those cans every 24 hours, you would pull half of them. It would take 48 hours to freeze a 300 pound block of ice. You could make a tank as big as you wanted to. You had agitators on each end to circulate the brine around through the tanks. In those days you used brine around through the tanks. In those days you used straight coils.

M.K.

That was with ammonia?

M.G.

You had to make a brine that would go down to as low as zero. But you normally carried your brine tanks somewhere around 14 degrees. It would circulate around those cans. That way you could make a block of ice in 48 hours, 24 hours the next time, and so on.

M.K.

I am envisioning a big vat with these cans sitting down there. Were there catwalks above it?

M.G.

It was an oak floor with lids on it. In the early days you would crank it up. But they put an electric hoist later on and you would dump the can out_ exactly the right amount of water. You would just pull this lever and dump all the water in those tins.

M.K.

I have never seen this operation.

M.G.

What you would do is pull every other rope. You pull one and skip one.

M.K.

Bring us into the use of refrigeration for comfort cooling. I guess that was a departure from these ice plants.

M.G.

With each ice plant you had a great big storage room and had to maintain a temperature below freezing to keep the ice from melting. We did that with pipe coils around the walls.

M.K.

So this ran the refrigerant with ammonia through the pipes. What were the refrigerant metering devices?

M.G.

Needle valves. Little needle valves. You would set the needle valves so you would maintain around 25 pounds ammonia pressure. That gives you about a zero temperature on the ammonia going through the coils.

M.K.

So it was a thermostatically controlled valve.

M.G.

They didn't have any automatic controls in those days. A little later on you bought the float controls. A tank which you hooked your coils to. About half full of ammonia and that was enough to keep all your coils saturated. That was a great improvement, otherwise you had to watch those expansion valves all the time so you didn't run ammonia back on your compressor. The big ice plants also had commercial cold storage plants tied in with them. They made ice in big commercial storage.

M.K.

So an investor or businessman would invest in a boiler or a diesel engine of some kind and a compressor and from that build.

M.G.

Coils and tanks, one manufacturer produce all of it, the equipment, and shipped it in on railway cars in those days.

M.K.

So he had a whole set of things, a kit. Frick and York were some of the early compressor people.

M.G.

They were the early ones. Henry Vogt built the ice plants. They did that with steam transferring ammonia, it circulated.

M.K.

What do you see as the evolution of refrigeration in your life?

M.G.

Well, it went into cold storages for meats and vegetables and so on. A lot of things we did in the early days, the old meat markets had a big refrigerator made, a 10 X 12 or so. They were buying ice and shoving it in those boxes overhead to keep their meat cold. Then we started putting brine tanks in the top of those boxes and coiled them with a small compressor. When the man would come in the morning he would turn on the compressor on and let it run all day to chill that brine out. From ice on the side. When he would leave at night he would pull the switch and it would stay cold all night. That was before they developed automatic controls. He didn't leave it running all night.

M.K.

If you were a butcher and you were sick at home, you had better get up and go turn the compressor on.

M.G.

That was the first thing you would do, meat and poultry. Now the wholesale fruit and vegetable people got started in the cold storage of vegetables and fruits. That was one of the early developments of refrigerants along with ice making.

M.K.

So for cold storage I see a room that is a big box and you have ammonia coils around the perimeter or some way.

M.G.

That's right. They were big rooms. Some of them would have to hold carloads of bananas or vegetables. They were insulted with four inches of insulation. They had to maintain temperatures around 50 degrees. That was a process of air-conditioning, keeping those cold storage rooms at a certain temperature. The evolution of air-conditioning is simply maintaining a higher temperature in a controlled space.

M.K.

How did that get started? Where was Willis Carrier while all this ice making was going on? Was he on the scene at all at this time?

M.G.

Mr. Carrier, I think he graduated from Cornell University in the early 1900s, went to work for Buffalo Ford who was an old fan manufacturer. Those fans were being used for cooling but they couldn't get the temperatures they wanted for comfort. I think his first development was the development of the centrifugal machine from _. That way, I think DuPont developed F 11, which is a refrigerant that worked in that type of machine. Actually , a centrifugal machine is a steam in reverse. That's just what it is.

M.K.

So there was some precedent for the concept of the centrifugal compressor.

M.G.

I think a printing plant in Buffalo was having problems with maintaining the correct humidity doing certain types of printing. That is one of the first jobs that he developed and installed while he was working for Buffalo Ford. Lyle, who is a graduate from the University of Kentucky, he got into that type of business. He and Mr. Carrier, and Ned Murphy out of Chicago, and a gentlemen names Stacey decided they would set up the Carrier Contracting Company. In the early days rather than building a compressor Carrier pretty much went like a contractor today, they went out on the open market and bought everything else and put it together.

M.K.

So he was very like M.T. Gossett up there. M.T. Gossett is down here building ice plants.

M.G.

That's right. They would go out and buy the components and put the thing together. I read quite a bit, I belonged to the association called the NAPRE when I was in Memphis.

M.K.

What does that stand for?

M.G.

National Association of Power and Refrigeration Engineers. The other association was ASHRE I believe, the American Society of Heating and Refrigeration and they combined and formed ASHRAE. That is how I got into ASHRAE. Are you interested in how I came to Nashville?

M.K.

Let's hear how you came to Nashville, you were up in Memphis right?

M.G.

I was in Memphis and had been working there several years for United Iron Works who owned the Sterling Ice Machine plant in Springfield, Missouri. The United Iron Works were big builders of oil field tanks. Since tanks were involved with the ice plant business and they developed compressors for the oil field work. So that is what I think got them into the ice making plants business and compressors. But they went broke just about in the middle 1920s. I came to Nashville during the flood in the spring of 1927.

M.K.

What do you mean during the flood?

M.G.

They had a flood in Nashville in 1927 that backed water out in all these little places. There was a poultry plant over here called Nave Spillers. I was still working for United Iron Works and they wrote in a quotation on ammonia compressor. They were going to have to put in some more ammonia compressors, doing some enlargement over there. Having been born about 40 miles from Nashville, that gave me my first opportunity to come back to my home country. So I came back here and went out to Nave Spillers and quoted them on the largest ammonia compressor that United Iron Works built, which at that time was about 75-100 horsepower. I was staying at the Hermance Hotel and I came down in the lobby one morning, I was getting ready to leave town after I put a bid in out there, and I ran into a friend from Memphis who was the Memphis agent for Frick Company.

M.K.

He was bidding on the same job?

M.G.

He said, "What are you doing up here?" I said, "I'm doing the same thing you are I guess." So he told me he had something he wanted to talk to me about. He said he was just about to sign up Nashville Machine Company as a distributor for Frick Company and they were looking for somebody to head up the refrigeration department.

M.K.

Why Nashville Machine?

M.G.

Because it is tied into the machinery business and they were machinists and installing steam engines and elevators and stuff like that. They were interested because their main competitor, John Bouchard and Sons, was a York distributor and they wanted to get into the refrigeration business because there wasn't but one company here and that was John Bouchard who was selling York equipment.

M.K.

John Bouchard was selling York. Was he making ice plants using York Machines?

M.G.

I don't think that at that time they were doing a lot of ice plants. Anyway he said, "How long are you going to be here?" I told him I was fixing to pack up and leave and he asked me to wait here that he was going to have lunch with Mr. Keeling, he was the principal owner, his family was.

I

This is Nashville Machine and his name was Keeling?

M.G.

Tom Keeling. I said, "Well I will be here around the hotel to see what happens." So he called me back and made an appointment for me to see Mr. Keeling at 2:30. He came up and told me what he wanted and made me an offer, which was substantially more than what I was making in Memphis, and I knew the United Iron Works was about to close up. I hated to leave because the man that I had worked with over there was one hell of a fine guy and I hated to leave him. But I went back and talked to my boss and he said, "Well, I will hold the deal open for you." So I went back and talked to Jack, T. L. Jackson and told him what I had been offered and he said, "Well, you know the situation at United Iron Works. I might not have a job two months from now. He told me if I wanted to do it go ahead and take it. So I called Mr. Keeling and accepted his offer and asked for at least a three year contract. He wrote me a letter and set up a quota and worked on commission. So I came to Nashville in 1927.

M.K.

Do you recall your quota at all?

M.G.

Well I made more than my quota the first year and I had a three year contract to run on. By the end of the third year they renewed my contract. That was in the 1930s. of course the depression was coming on but I got another contract to run three more years.

M.K.

Was that common in those days? A contract?

M.G.

Oh, it was a letter of agreement.

M.K.

You beat your quota the first year, making money, doing pretty well.

M.G.

I had my quota and travel expense.

M.K.

You weren't 30 years old at this time were you?

M.G.

I was 24 years old.

M.K.

That’s a pretty good position for a 24 year old.

M.G.

I took over the department and set it up. He didn't have a refrigeration department. I opened a branch office in Chattanooga. My brother came down and went to Chattanooga to take the Chattanooga office. I opened another office in Knoxville with a fellow named Johnson. That's where Nashville Machine Company got into the refrigeration contracting business.

M.K.

They had offices in Knoxville, Chattanooga and Memphis?

M.G.

No, the main office was here. There was another supply company in Memphis, Reed and Decker that handled Frick Company over there.

M.K.

So the first line you dealt with was Frick compressors and that was ice plants and cold storage plants.

M.G.

Back in those times we had begun to do a lot of small cold storage plants, produce houses and meat packing.

M.K.

Small groceries and things like that. Watch your hand. Some poor girl is going to have to try to translate this and put it on paper. By the way we will bring that to you and let you review that and approve it before..

M.G.

What you need to do is double-space it and leave room for my corrections.

M.K.

Yes, they will do that. You will see how they do that. Okay. Who were the early players at Nashville Machine? You set up the refrigeration department, who were the players in that, people that you respect?

M.G.

You mean customers?

M.K.

No, I was thinking in terms of the people in Nashville Machine who were good strong people. People with manufacturers that you respected, that you got a lot of help from. I imagine you leaned pretty heavily on the manufacturers.

M.G.

They were agents at that time for Skinner Uniflow steam engines and they were doing elevators. They were also in the mill supply business. Lincoln Motors, I remember they were distributors for Lincoln Motors. You had to have motors and you had to have valves and fittings and stuff. Frick Company made all the heavy ammonia valves. They had to be special heavy valves to handle ammonia.

M.K.

So Nashville Machine was very much involved in machinery of different sorts, and this is with Tom Keeling.

M.G.

Yes. It had the electrical department which Mark Young ran. He was rewinding motors and electrical work and they had an elevator department. So then this set them up in a refrigeration division.

M.K.

Alright. So that is how that started. I have often wondered how. Okay. Did Mr. Keeling own Nashville Machine at this time? Was it a proprietorship?

M.G.

No. He married the daughter of some family that had some money that owned the principal interest.

M.K.

I see.

M.G.

I don't remember exactly who the lady was. She owned some buildings up on Church Street. They handled pipes and fittings and mill supplies and also the steam contracting business, steam boilers and things like that.

M.K.

Radiators and stuff like that. They were very much involved in the contracting business as it involved machinery and pipe and electricity. Quite a comprehensive firm, really.

M.G.

Their competitor, John Bouchard and Sons, I don't know if you ever met John Bouchard. John the III Is now running that company.

M.K.

Tell me a little about John Bouchard at that time as it relates to Nashville Machine. Were they all in the same sort of business?

M.G.

They were in the same sort of business and his father, John Bouchard's father, came down from Canada and had two sons and he was John Bouchard and Sons. They were in the foundry business primarily. Then they got into the mill supply. They and the Nashville Machine Company were two of the only people in Nashville at that time and were pretty strong competitors. John Bouchard was the main one after his father died. He took the business and ran it. Then John, Jr. came along and his father died and he took over the operation. Of course he had a lot people in there in the meantime, people who were running the different departments. I think John, Jr. is a graduate from Vanderbilt Engineering, I believe. I became good friends with John, Jr. Then he died all of a sudden and John III came in and took over.

M.K.

That might be another interesting interview sometime. Okay, so here were are over at Nashville Machine and we are starting out refrigeration department. You mentioned a job that preceded the B&W Cafeteria. It was a very interesting job in your eyes.

M.G.

I didn't do the B&W Cafeteria while I was a Nashville Machine. That was done after I got involved with the Carrier Corporation. What I was doing at Nashville Machine Company tied me in with some people that later became tied in with Carrier and that sort of paved the way for me to get into the Carrier air-conditioning business.

M.K.

I see. Alright, lead us into that a little bit. Tell us how that evolved.

M.G.

I stayed there until Nashville Machine Company, I believe it was about 1933, we were doing a lot of heating and cooling ducts. In the heating industry there was a York Heating and Ventilating Company, York, Pennsylvania. They built steam coils and we bought quite a few of those and put them in large industrial plants for heating which was the beginning of handling units of heat instead of just radiators the southern representative for York Heating and Ventilating was in Atlanta and we did business with him. But one of the principle owners of York Heating and Ventilating was a Nashville man named Paul Gant. He had two sisters who were school teachers and he had a brother in the lumber business out at Noland. Paul Gant came to Nashville to see his sisters and I met him because we were buying from them these large type fan units for heating. That is how I got acquainted with him. As time progressed

we did more and more of that work and I realized that Carrier was the principle at that time in the air-conditioning business.

M.K.

Well, wait a minute, I thought Gant was with York.

M.G.

He was with York, but here is what happened. Carrier, as you remember, did not have all the components for completing a air-conditioning system. So when they formed, the original formation was Carrier, Brunswick - Kroeschell. Kroeschell were builders of ammonia compressors and they merged with Carrier. Then they sold and they merged with York Heating and Ventilating, merged with Carrier.

M.K.

Okay. Let me see if I can track this with you. York Heating and Ventilating, a Mr. Gant, brought to the package an air handling unit, a fan and a coil.

M.G.

Fan and coil unit.

M.K.

Okay. What the other- Brunswick?

M.G.

Brunswick Kroeschell.

M.K.

Brunswick Kroeschell, what did they have?

M.G.

They built CO2 compressors. Large compressors that used CO2 instead of ammonia.

M.K.

What did Carrier have at this time?

M.G.

They didn't have any compressors.

M.K.

What did they have?

M.G.

They had to go out and buy it on the open market until they merged with the folks at Brunswick Kroeschell. Then York Heating and Ventilating merged.

M.K.

Okay, so now we have had compressor and air handling units. I still can't figure out what Carrier is bringing to the table at this stage. Is he an installing contractor?

M.G.

They had become manufacturers by that time and they built a small package unit.

M.K.

A small compressor?

M.G.

A small compressor unit. With this __ equipment _ York Heating and Ventilating. They moved those plants up into Newark, New Jersey. Carrier bought the old General Electric plant in Newark. With that

the inherited Lemmiel Boerware (spelling uncertain) who was a president of the ice plant, that division of General Electric.

M.K.

Say his name again.

M.G.

Boerware.

M.K.

What was his first name?

M.G.

Lemmiel.

M.K.

Try spelling Boerware.

M.G.

He was vice president or a president, head of that General electric plant. They bought the plant and I think they made a deal of some kind with Boerware to come in as a business deal. You know, Mr. Carrier was not a business man. He didn't care anything about finances and the details of running the business. He was primarily interested in engineering. So that Lemmiel Boerware (spelling uncertain) as a business manager. They started leaning toward setting up distributors. There was a young fellow, Don Edwards, who came down here to Nashville to represent Carrier, and he was a graduate of the University of Kentucky. I guess J. I. Lyle, who was a graduate of a university, and Margaret Ingels, why I imagine him being a Kentucky boy, he came from over in Lebanon, Kentucky. His father was a banker over there, I believe. John came down here and I got involved with him installing some air-conditioning equipment. They sold to Tennessee Chemical Products. They started manufacturing Breathem tablets which are similar to some of the tablets that you buy now.

M.K.

Breathem tablets? What did they do? Were they antacids or aspirin or what?

M.G.

They were similar to cough drops. They were produced in the old Cumming station building over there. It is for sale now.

M.K.

I want to pursue that name, Paul Ingels. Was it Paul Ingels?

M.G.

With Carrier? No it was Margaret, a lady.

M.K.

But you say there was a young man who came to Nashville?

M.G.

Don Edwards. Don came down here when there was the American Trust Building. That was all they had. He dropped by on prospects.

M.K.

Now, these small packaged units that you are talking about. Are we into Freon for refrigeration at this stage?

M.G.

No we are not.

M.K.

Okay, tell me what we are into.

M.G.

We are into methyl chloride.

M.K.

Methyl chloride. Here is another refrigerant.

M.G.

Yes, and sulphur dioxide. Frigidaire started building boxes and Kelvinator used sulphur dioxide.

M.K.

As a refrigerant?

M.G.

Yes, as a refrigerant. That damn stuff, it is just about as tough as ammonia if you had to breathe it, but that was the first small compressors, used sulphur dioxide.

M.K.

But the packaging concept came from Carrier. I think that is what you are trying to tell me.

M.G.

Yes, that is where the package air-conditioning came from but it was a huge thing when you packaged it up for a window. Most of them then made little waterproof units and hooked them up on a water line and ran them into the sewer. This first air-conditioning job with Carrier, as I recall, in the small equipment business, was this plant manufacturing these tablets. Primarily people used them when they were drinking. They had bootleg whiskey in those days you know. And they would take these tablets.

M.K.

Tell us the name of the firm.

M.G.

No, it was chemical. It was the Tennessee Products Company. They owned an iron furnace out about 50 miles and they were also in the insulation business. Somebody in their business cooked up the idea to manufacture these tablets because they were in the chemical business.

M.K.

Breathem.

M.G.

What was happening in the process was that they were sticking together. They couldn't get them packaged. So Carrier made them. They sent an order in for that and they shipped all the equipment down there and I helped them install it.

M.K.

Tell me what it looked like.

M.G.

They had a small compressor that was waterproof and it had a big round tank with coils in it to cool the water. Then they circulated the water through the suspended units.

M.K.

So they ran chilled water through the fan coil unit. Okay. So we have sulphur dioxide as the refrigerant in a refrigerant loop being water cooled.

M.G.

I believe they used ammonia on that one. They used ammonia compressors on that one.

M.K.

Basically a chiller isn't it? A packaged chiller.

M.G.

Coils in there and you would chill the water and it would circulate it around those parts. It wasn't a big job, maybe a three or four ton job just to cool one room where all these tablets were packed.

M.K.

Were you at Nashville Machine when this occurred?

M.G.

Yes, I was at Nashville Machine and they got us to install it for them.

M.K.

You were also representing Frick, but they didn't have anything packaged this small.

M.G.

No. Frick didn't get into that type of work at all. So that was one of the first air-conditioning jobs. The next most interesting job that I did, it was still with Nashville Machine Company, was Bicksler Hotel Company built the Andrew Jackson Hotel and coffee shop. Pretty soon after I came to Nashville I met the engineering who had charge of doing all the work for the Dinkler Hotel chain. The Lookout Mountain Hotel was built and we had a contract to install all the refrigeration. Did you ever hear of the Dinkler Hotel Corporation?

M.K.

Well, I think I have but I don't know it.

M.G.

They had a hotel in Atlanta, Birmingham, Savannah, and here. Later they took on the St. Charles Hotel in New Orleans. O'Henry in Greensboro, a pretty good chain. When they came up there I would put in an ice making tank and while I am circulating the system, take care of all the refrigerators in the kitchen. When they signed a contract to take it over and operate it, they came up and looked at it and they__. J.D. Howe built the Lookout Mountain Hotel in Chattanooga. I met them there and we went up there and they looked at it and said, "Well the ice making system is half big enough, we need to enlarge that and all the kitchen refrigerators." So when we wound up, what I had put in up there and ordered for it was just half big enough so they just doubled the order for the equipment. When they finished it why of course I had met all the people from Atlanta. I was involved with the Dinkler chain and all their equipment. The Andrew Jackson was here and I looked after the equipment and sold equipment up there. They shipped a young fellow up from Atlanta and made him the chief engineer during the job, named Jim White. So Mr. Genonni, who was an Italian, was a cousin of Mr. Dinkler. Mr. Dinkler and his mother were sisters, that is how he came in. He was a fine artist. He could design and decorate anything you ever saw. But he did not know too much about machinery so he and I just looked after the machinery for the Drinkler chain. He came up here one day and he said, "We need to air-condition this place." I don't know whether you were here when the Andrew Jackson was running. They had a restaurant right on the corner there, on Sixth Avenue. Were you born around Nashville?

M.K.

No sir, I was not. I'm from St. Louis prior to this. I went to a little school in Raleigh, Missouri. If you got to Springfield, Missouri you would know where Raleigh was.

M.G.

Okay. Anyway, he came up and said, "We need to cool this restaurant." Can't you find some equipment to cool it with?

M.K.

Let's back up out thinking a little bit. You were talking about the Andrew Jackson restaurant. The man wanted you to come off the brine system. He knew he had cooling but he didn't have it in a restaurant situation.

M.G.

That' right. So I had done this work, I may be repeating for just a minute, for Peabody College, and they had a bunch of radiators and a fan out there that they told me to get rid of. I told Mr. Genonni I knew where there was a fan and some radiation we can get and a cabinet that all goes all together. We went out there and looked at it and he said, "Well they have got enough room down there in the equipment room, what do you think they want for it?" I said, well they want about $50 for all of it to get rid of it. He said, "Hell, let's buy it and take it down in the storage room and hook it up to those brine tanks and run some duct work up in there and cool that coffee shop." So we bought it and took it down there and set it up. Just common radiators now.

M.K.

These are cast iron radiators.

M.G.

Yes, the old time radiators. They were built to go into a cabinet for fan heating. We set that thing up down there and hooked it up on the brine tank and another compressor, they were making ice down there then in the tank and so we just put another compressor in there to keep the brine cold and circulated through those radiators. In order to keep it from freezing up why this manufacturer in Knoxville called the Sylphon Valve Company, they began to make all the automatic control valves, so we bought a control valve from them and hooked it up on the brine line and put the bulb of the control valve in the air stream, clamped it onto the oils because the coils were not just cold enough to freeze up it would hold the coils around 48 to 50 degrees by circulating the brine through and there was an automatic valve that would control the amount of bring that went through.

M.K.

Was that coil the Sylphon coil?

M.G.

Sylphon, I believe.

M.K.

But it was designed to control at about 45 degrees.

M.G.

We clamped the bulb on the outlet from the return line coming out of the bulb. So the temperature on the line never got below 40, 45 or 50 degrees. You didn't get any ice on your radiation. That worked for four or five years before I sold my five ton Carrier unit and put it in there when I made this changeover. So that was really the first small commercial air-conditioning system.

M.K.

I get the impression that I am in the presence of not only a good engineer but also a good salesman. As another salesman, I want to know what went wrong with that job. I can't believe that it was all right and roses.

M.G.

Actually, for some unknown reason it worked fine. We never had any trouble with it. Having the best control valve did the trick. If you had to do it by hand there would have been no way to keep from running back and forth. I knew about the Fulton Sylphon Company. It had been sold now. Having an office and working on refrigeration up in Knoxville I knew some of the people and knew the type of valve they were building. At that time they were the only people. Powers, I don't think we're building anything like that.

M.K.

But the control of the brine at those temperatures was a key ingredient.

M.G.

Absolutely. Circulate the brine out of the pump. The idea was to have control valves coming into the_ supplying the brine so that it would not open after it got down to 40 degrees.

M.K.

Sounds pretty good. Did you get a bunch of condensate off it.

M.G.

Yes.

M.K.

The cabinet wasn't insulated was it because it was a heating cabinet.

M.G.

It was for heating but we reinsulated it.

M.K.

You put more insulation on it. You were still at Nashville Machine.

M.G.

I was still at Nashville.

M.K.

Was Bouchard doing anything like that at all?

M.G.

They had been doing some work in that area. I think they installed, they had an old ammonia compressor installed in the theater here in Nashville prior to that time. But the thing got to leaking ammonia and it got out into the building and they had to shut it down and couldn't use it.

M.K.

Still now, there were two firms here. Nashville Machine with an M.T. Gossett pursuing comfort cooling.

M.G.

Primarily refrigeration but beginning to think air-conditioning.

M.K.

Okay lets go from there.

M.G.

Until Bouchard got the bigger equipment he didn't get in to the air-conditioning business. Bouchard was doing a lot o steam work and stuff like that. They did some air-conditioning jobs later on and they would buy equipment.

M.K.

There were beginning to be more packages. About what year are we into now?

M.G.

I say about 1933.

M.K.

You left Nashville about then.

M.G.

It was the spring of 1933. I went over and went to work for Buford Brothers. I had this situation going with Carrier.

M.K.

Start that story a little bit. You were at Nashville Machine. You were a Frick representative. Here is a guy out here, Carrier, beginning to package fans and coils and compressors and getting a package unit.

M.G.

Edwards who was still here with Carrier. I told him what I wanted, let Paul Gant know. By that time York Heating and Ventilating had merged with Carrier and they had begun to build package units.

M.K.

What did you tell them you wanted at this time?

M.G.

I wanted to get the distributorship for Carrier. Jim Hart, who was the engineer at the Andrew Jackson, I believe he was president of NAPRE at that time, the American Association of Power Engineers. He was the president and I was a member of the same organization. The national meeting was in Buffalo. Him being president they appointed him as a representative and appointed me as a deputy.

M.K.

What did you do wrong to get sent to Buffalo?

M.G.

I was a member and I was in the mechanical business and being a member why _ president and one other. I made an appointment to go out to the Carrier plant in Newark, New Jersey and interview. Paul Gant and Templin, who was in Atlanta, York Heating and Ventilating recommended me. I arranged for an appointment at a time when Jack and I were going to Buffalo. He and I went to New York and the world's fair was going on in Chicago so we decided we would go to New York and stay one or two nights before going to Buffalo for the convention. When I got to New York I called over there and made my appointment. The Nashville territory came under the Chicago office at that time. After I interviewed and told them what I wanted they asked if I had somebody to back me. I had already made arrangements with Buford Brothers to go to work for them. I told them I thought we could get the Carrier franchise. They asked what I wanted in the way of a salary and I told them I didn't want a salary. I told them I wanted to work on commission. I told them to give me an office and a secretary. I went over to York and interviewed the people over there and they said I needed to talk with Mr. Grimm out in Chicago. If you can work something out we will send a man down to Nashville and look over the situation. Jim Wright and I went to Chicago. I went to see Carrier and they said they would send

somebody down there to look things over because they would like to have somebody down there. Mr. Bickell came down and he said if we could get the thing bankrolled they would go along with it.

M.K.

What kind of business was Buford Brothers in at this time?

M.G.

They were in the supply business. Supply and automotive equipment.

M.K.

They weren't into the refrigeration or compression business?

M.G.

No. I set up an engineering department for them.

M.K.

When you mention engineering I don't hear any college or degrees. Was it hands- on engineering?

M.G.

It was hands-on.

M.K.

There is nothing wrong with that.

M.G.

Anyway, he came down there and made arrangements. They didn't have a lot to sell at that time. We bought a couple of these package units that they were building. I had a job to do an ammonia compressor in a milk plant. We wound up with an order for about 1,200 to 1,500 dollars. That was the start of the thing. That was in 1933. In the summer of 1933 when I was with Nashville Machine Company and I went to Memphis to bid on an air-conditioning job for B&W Cafeteria. They opened the B&W in Nashville in 1930 and I installed the refrigeration equipment for them in the cafeteria. One of the partners, Mr. Burriss, they decided they would go to Memphis. They went there and opened a cafeteria and decided they were going to air-condition it. I went down and bid on it using Frick compressors. At that time Frick was building a compressor that you could use Freon in. And York was building one. They took the old ammonia compressors and just adopted the name Shaft Seal to keep the Freon from leaking out. I went down and while I was there I met Mr. Murphy from Chicago who was done there bidding on it for Carrier and I was bidding on it using Frick equipment. York was in there bidding on it. The only mechanical engineers that I know of at that time was Allen and __ in Memphis. __ was bidding on jobs that he made up while I was in Memphis. I knew he always went to York. I think York helped him design the job. Anyway it would up going to York. That's where I met Mr. Murphy, who was at that time one of the four men who developed Carrier.

M.K.

Ed Murphy. Shaft Seal, were these direct drive compressors with the motor outside the compressor.

M.G.

No. _ drive.

M.K.

So the two pieces of gear, the motor and the compressor were separate.

M.G.

That was a pretty good size piece of machinery. About a 35 to 40 ton air-conditioning system.

M.K.

How did you deal with the parts load requirement. Did you have unloaders?

M.G.

Yes. They had an unloader value installed there and used the thermostat on return air for _ compressors. You had to use a homemade type starter that had overload protection built in to it.

M.K.

So you didn't get the B&W job.

M.G.

No. we got the B&W going here. That was early in 1933. Late in 1933 was when I went over to Buford. Then we started talking about doing the B&W.

M.K.

Okay enter some more players here at this stage. Who were the people bidding for B&W?

M.G.

York out of Memphis and Buford Brothers. Anyway, we laid that job out. Templin was there and York Heating and Ventilating. They knew the ventilating engineer. Templin for Atlanta came up and he and I sat down and figured out how much air it would take to do the job, then we figured out how much air it would take to do the job, then we figured out the people load, the building. Then we had to go up and lay out all the duct work and so on. We had to do complete engineering on that. York came in with their own designs.

M.K.

Were they comparable?

M.G.

Yes. They were about the same. At that time carrier started building small compressors. This job was around 40 tons so we divided that into four 10-ton type compressors. It was in April of 1934 when e got this thing figured out to bid on it. The York guy came up from Memphis and made a bid. I made my bid the same day. The Carrier national sales meeting was in Newark in the next day or two after that. They were going to make their decision the next day and I had to catch a plane that afternoon. So I asked them if they could make a decision by 10:00 a.m. the next morning because I had to catch a plane. He called me and told me I had the contract if I wanted it. I signed the contract and they asked me if I wanted any money and I said no. I went to the sales meeting and I was the only salesman that brought in an order.

M.K.

That made some points.

M.G.

We had the B&W job in the factory and they were building equipment. That consisted of two of those York Heating and Ventilating air handling units. They had a bank of air thin coils. They were using coils manufactured by Air Temp.

M.K.

Are there plate thin coils now? They are no longer radiator.

M.G.

No. they are thin coils. They were already building them with the steam coils. So all we had to do was slide in a set of heating coils right on top of them. Just put in another section and size the fan unit to

handle the amount of air we needed. They handled about 6,000 CSM air each. That made it fairly simple then because you could get this stuff sized down to where you could get it in place.

M.K.

Physically put it in the building. At our anniversary banquet it seems to me, M.K. C. Thomason talked about getting involved in the installation of that with the compressors in the B&W Cafeteria.

M.G.

Mr. Thomason was over at the Nashville Pure Milk Company as engineer. He had been doing work, I think he put some York Heating and Ventilating units in out there. When I got all the equipment in I didn't have but two men down there, actually one to do the installation on that job. So I needed someone. The only time we could do it was at night because the cafeteria had to run in the daytime and we couldn't interfere with the operation. So we got the building modifications and put in the steel to support the equipment, but I didn't have enough help to do this job so I went out and asked him if he wanted to work some at night. So he came down and we put it in at night.

M.K.

So we've got two 6,000 CFM air-handling units and we've got two packaged compressor units that match up with__

M.G.

No. What we did, we put split coils in each unit. In other words, two sets of coils in each unit, then we had four compressors. We connected two compressors, the compressors separate, you couldn't hook them up together. You had one circuit for each compressor.

M.K.

But the compressors, were they water cooled?

M.G.

No. They were air cooled. The ammonia compressors had to have water jackets on them.

M.K.

Ok, but these were now Freon compressors.

M.G.

Freon compressors, you didn't have to run water through but you had to run water through the condenser.

M.K.

Were you using city water?

M.G.

No. I designed a cooling tower. We put the cooling tower on the roof with a water pump to circulate water though those condensers.

M.K.

Were the slats in the cooling tower metal then?

M.G.

Metal. We had the slats on the side. Forced air tower?

M.K.

How long did it work?

M.G.

I guess for 25 years. Then we put in a conventional cooling tower. The equipment was still running when they tore the cafeteria down. It had been running for about 40 years.

M.K.

Except for your initial order of $1,200 worth of packaged equipment, this order for the B&W Cafeteria was very much the early equipment that you sold for Carrier.

M.G.

That was the first real nice big order.

M.K.

You made money on it?

M.G.

Yes. I made good money on it. See, my contract was no salary. I worked on 40 percent of the gross profit.

M.K.

Let's get back into Mark Young and what he meant to the early days of refrigeration.

M.G.

When I came to Nashville Mark Young was head of the electrical department. As we gradually got into the refrigeration business automatic controls were just beginning to be developed for the refrigeration industry. If we had a problem or had a job we had sold that had automatic controls on it, we would just tell Mark Young what we wanted to do and how we wanted it to work and he would get out a piece of paper, and it wouldn't be but a few minutes, he would have it all laid out just like it needed to go in. when the job was ready to be wired up and put into operation Mark would go on the job and do it. You wouldn't have to worry about it working, it would work. If we had some old jobs in trouble he would go and straighten those out.

M.K.

That's a good thing to say about somebody, that his jobs worked. I was so impressed with Mark Young when he sat here, that inquiring mind.

M.G.

I think the elevator department used him the same way. When they installed elevators he would go up there.

M.K.

Anything with a control problem he knew how to fix it and get it right.

M.G.

While we are on that subject, we were selling and Mr. Keeling was primarily the one that did the selling on Skinner Uniflow engines and electrical generators. There again Mark Young just fit right into the pattern because they had switch gear and panels on the electrical generators that had to be taken care of. He worked in all phases of Nashville Machine company.

M.K.

It sounds like he was a very most valuable part of Nashville Machine.

M.G.

I don’t know if you ever saw a Skinner Uniflow engine or not.

M.K.

No sir, I haven't.

M.G.

It was the Cadillac of the steam engines. Most beautiful operating machine I think I've ever seen in my life.

M.K.

Where did they use them?

M.G.

Two of the outstanding jobs we did was the Stallman Building. They put some new boilers and Skinner Uniflow engines in there and over at Nashville Life.

M.K.

What were they doing with these engines?

M.G.

They were generating all their own power for lighting and driving all the motors in the building.

M.K.

Were these single__?

M.G.

Back in those days the power systems were not heavy enough to carry big loads big buildings required to such an extent that it was cheaper to own your own generating equipment. They didn't have any TVA's back in those days. Most big industrial plants had their own power generating system. Most of them were coal fired.

M.K.

So that's where Nashville got the reputation of coal smoke in the air?

M.G.

Yes.

M.K.

Okay, let's go back to the B&W Cafeteria. You had a mechanic, Barclay, and M.K.C. Thomason. Come from there to the beginning of consulting engineering in this town as we know it. Tommy was obviously one of the early mechanical consultants.

M.G.

When we finished the B&W Cafeteria the business people from all around were having lunch and dinner and enjoying the comfort of the air-conditioning in Nashville because enjoying that comfort made people realize how important it was. I think there was not an engineering concern in Nashville who did air-conditioning design, air-conditioning and heating. The nearest were the ones in Memphis and I think there was one in Atlanta.

M.K.

Allen and Herschel in Memphis and Milkum and Boyd in Atlanta.

M.G.

Right. They were the only concerns near Nashville.

M.K.

Did you know a guy by the name of John B? in St. Louis?

M.G.

No. Tate Engineering, I had some experience with them out of St. Louis. There was a Tate family in the engineering business there, and they also, Frick agent distributors like Nashville Machine. The

headquarters of the St. Thomas Hospital, the Tate's did a lot of work for the hospital and they sold refrigeration job to St. Thomas here in Nashville. My brother worked for Tate after he left the Fulton Ice Machine works. Tate sold this job to St. Thomas hospital and we helped him install that being the local Frick distributors. We also installed a Uniflow steam engine out there for them to generate power.

M.K.

Okay, to get back to B&W and what was happening there.

M.G.

As I said there were no engineers here. When we finished the B&W Cafeteria, not too long after that the Supreme Court building installed an air-conditioning system up there. I think we bid on the job and some other contractor got it using Frick equipment. General Fielding, he was attorney general of the Supreme Court, he had charge of the building. He ate in the B&W Cafeteria quite often. When they were finishing up that job, Mr. Webber, I was up there for lunch one day, said that General Fielding wanted to see me. I went back the next day for lunch and General Fielding was there and he came over and told me he had to have an engineer up there at the Supreme Court Building. He told me he had four or five applications and he wanted me to come over and look at the list of names. So I went and about the third man down was M.K.C. Thomas. I took my pencil out and circled his name. I don't know if I ever told Tommy that.

M.K.

Okay, they had an air-conditioning system.

M.G.

Yes, they had an air-conditioning system ready to go. So Tommy took an office space in the building up there and he started designing engineering work, doing engineering work on air-conditioning units. That's where he started in the business.

M.K.

Was he doing state buildings, others buildings for the state.

M.G.

Yes, he had some arrangement with the state where he was looking after the Supreme Court Building and he was designing equipment for other buildings. He got Don Nichols to come over and work for him while he was there in that office. In addition to doing the state work he started doing some independent engineering. That's where he started.

M.K.

That's neat. When we had our 25th anniversary there was a fellow there by the name of George Campbell who was out of Chattanooga that, the way I understand it, he claims to have preceded Tommy as far as being in the consulting business here. He was in the service and when he came back Tommy was already established and George went to Chattanooga. I think George was an electrical engineer.

M.G.

I think he was too. I think he branched out.

M.K.

Okay, so you are still at Buford Brothers and you are talking packaged air-conditioning and it is beginning to pick up in Nashville, you are getting people who want to air-condition different spaces.

M.G.

Right, we did the American National Bank, first job for their accounting department. I believe that was the first bank in Nashville. Anyway, this was where all the accounting work was done. You know how hot it can be with a bunch of electrical stuff going, adding machines, and one thing and another, plenty of light. They wanted the third floor done. Incidentally, do you remember Andy Benedict, the retired president, chairman of the board and everything. I've got a picture of that job, I had one, with Andy sitting on top of the adding machine. He stated out when he graduated from Vanderbilt in the bookkeeping department there. I framed that picture and sent it to him when he became president of the bank. I wrote on the bottom of it "Young man on his way." I said congratulations on your success.

M.K.

I bet he treasured that. Okay, we have just a little bit of tape left here, let's talk about Willis Carrier and your recollections of him and Margaret Ingels.

M.G.

Oh yes, let's time him into B&W's job. After we got the B&W job started in the summer, sometime during the winter time, Mr. Carrier was making a trip through the south and we arranged for him to come to Nashville. We arranged a luncheon and invited him and quite a number of businessmen I knew around I thought might enjoy hearing him talk about the development of air-conditioning. We had one little steam coil out on one of those duct binds up there that had not been performing like it should. We thought we had the thing piped ok to do it and he asked if we had any trouble with the job, was it working all right? I told him it was working fine except for that one little old steam coil up on the hook line going over to the front office. I was having breakfast with him and he said let's go up there and look at it. He said, "there is your trouble right up there, the air vent you've got it not high enough about the coil." He hooked it on a little different and it worked fine, we never had a bit of trouble after that. Then we went on to the luncheon.

M.K.

You made money on that visit no matter what. What kinds of things would he tell people at that stage?

M.G.

He being primarily interesting in engineering, he liked to talk about the development of things. One of the things he talked about a great deal at that time, it was very interesting, it was the development of the air-conditioning business in South Africa in the gold and diamond mines. You know he personally went down there and diamond mines. You know he personally went down there and did a lot of design work in the diamond and god mines.

M.K.

Those things are tough.

M.G.

Yes, when it's 150 degrees and people trying to work down there. I remember one funny thing that happened when he was down there. He had gone to South Africa to do some engineering work and had been down there about a month. He was due to leave and something came up and they called Johannesburg at the hotel where he had been staying and he had already checked out. They checked the steamship line they thought he would be coming back on and he hadn't left on that ship. They didn't know where the heck he was. Somebody picked up the idea that he had probably taken another ship. It was several days and they knew he had left down there. He had taken a slow boat out of South

Africa, an old freighter on which they had accommodations, and he had worked out all the problems they had on that ship.

M.K.

If they had perishables on board he was probably trying to sell them some on-board cooling.

M.G.

I just happened to think about that. That is the kind of fellow he was, he was an engineer and a very fine gentleman.

M.K.

How old was he at this time?

M.G.

I would say, I remember when he died, that was 1950, because I was president of the Kiwanis Club and I was at a meeting in Chattanooga. I got word that he had died and I called my…

End of Part One